

CUSTOMER NO.: 24498

Serial No. 09/916,919

Reply to Office Action dated: 03/24/05

Response dated: 06/24/05

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REMARKS

In the Office Action, the Examiner noted that claims 1-20 are pending in the application and that claims 1-20 stand rejected. None of the claims are amended by this response.

In view of the following discussion, the Applicant respectfully submits that none of these claims now pending in the application are anticipated under the provisions of 35 U.S.C. § 102 or obvious under the provisions of 35 U.S.C. § 103. Thus the Applicant believes that all of these claims are now in allowable form.

Rejections

A. 35 U.S.C. § 102

The Examiner rejected claims 1-3, 6-7, 12-17 and 19 under 35 U.S.C. § 102(b) as being anticipated by Tanaka (U.S. Patent 5,764,847). The rejection is respectfully traversed.

The Examiner alleges that regarding claim 1-2, 6-7 and 12, Tanaka in FIG. 2 discloses a system and corresponding method comprising all of the aspects and limitations of the Applicant's invention. The Applicant respectfully disagrees.

"Anticipation requires the presence in a single prior art reference disclosure of each and every element of the claimed invention, arranged as in the claim" (Lindemann Maschinenfabrik GmbH v. American Hoist & Derrick Co., 730 F.2d 1452, 221 USPQ 481, 485 (Fed. Cir. 1983)) (emphasis added).

The Applicant submits that the Tanaka reference fails to teach, suggest or anticipate each and every element of at least the invention as recited in the Applicant's claim 1, which specifically recites:

"A method of recording multiple programs onto a storage medium, comprising the steps of:
receiving a plurality of multimedia inputs;
sampling the multimedia inputs such that the sampled multimedia inputs contain a portion of the plurality of multimedia inputs;
combining the sampled multimedia inputs; and
encoding the sampled multimedia inputs such that the number of encoding devices required to encode the sampled multimedia inputs is less than the number of the plurality of multimedia inputs." (emphasis added).

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The Applicant's invention is directed at least in part to a method for recording multiple programs onto a storage medium and systems for encoding a plurality of multimedia input signals including sampling the multimedia inputs such that the sampled multimedia inputs contain a portion of the plurality of multimedia inputs, combining the sampled multimedia inputs and encoding the sampled multimedia inputs such that the number of encoding devices required to encode the sampled multimedia inputs is less than the number of the plurality of multimedia inputs.

In support of the Applicant's invention, at least as claimed by the Applicant's claim 1 recited above, the Applicant in the Specification, specifically recites:

"As shown in FIG. 1, the encoding path 110 can include one or more samplers 114 for sampling a corresponding number of video signals. These sampled video signals can then be fed to a video combiner 116, which can combine or merge these sampled video signals. Next, these signals can be encoded by the video encoder 118 and then transferred to a multiplexer 120. The encoding path 110 can also contain one or more samplers in the form of downmixers 122 for sampling or downmixing a corresponding number of audio signals. The downmixed audio signals can then be sent to an audio combiner 123, which can combine the downmixed audio signals. These downmixed audio signals can then be encoded by an audio encoder 124 and transferred to the multiplexer 120, which can multiplex the audio and video signals." (See Applicant's Specification, page 5, lines 7-17).

And

"Specifically, a plurality of multimedia inputs can be received, and these inputs can be sampled such that the sampled multimedia inputs contain a portion of the plurality of multimedia inputs. These sampled multimedia inputs can then be combined and encoded such that the number of encoding devices required to encode the sampled multimedia inputs is less than the number of the plurality of multimedia inputs or alternatively, less than the number of sampling devices used to sample the plurality of multimedia inputs." (See Applicant's Specification, page 6, line 22 through page 7, line 4).

The Applicant, in the Specification, further recites:

"At step 210, a plurality of multimedia inputs can be received. These multimedia inputs can be audio signals, video signals or a combination thereof. Moreover, the invention can receive any number of multimedia inputs.

At step 212, these multimedia inputs can be sampled such that the sampled multimedia inputs contain a portion of the plurality of multimedia

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inputs. For example, the resolution of the pictures contained in each of the plurality of multimedia inputs that are sampled can be less than the resolution of the pictures contained in each input prior to the sampling process. A number of sampling techniques can be employed to perform this step. As an example, if video is being received, then the resolution of the video signal can be reduced by removing lines of resolution or by removing pixels from the pictures contained in the video signals. If audio is being received, then each audio signal can be sampled or downmixed by removing one or more channels of audio contained in each of the audio signals." (See Applicant's Specification, page 7, lines 11-24).

It is clear from at least the portions of the Applicant's disclosure presented above that the Applicant's invention is directed, at least in part, to a method and systems for recording multiple programs onto a storage medium and for encoding a plurality of multimedia input signals including sampling the multimedia inputs where multiple video signals and corresponding audio signals are received and respectively sampled and combined such that a number of respective encoding devices required to encode the sampled and combined video inputs and corresponding audio inputs is less than the number of video inputs and corresponding audio inputs. In the Specification, the Applicant discloses examples of such sampling by reciting:

"Two D1 video signals can be received. The D1 signals are video signals with a picture resolution of 720 X 480. In some instances, the picture resolution is 704 X 480. These signals can be sampled thereby converting them to 1/2 D1 video signals, *i.e.*, video signals with a picture resolution of 352 X 480. As a result, each of the sampled 1/2 D1 signals contains a portion of its original, corresponding D1 video signal. In another example, the D1 signals can be sampled down to 1/4 D1 signals or standard input format (SIF) signals with a picture resolution of 352 X 240. Although the foregoing discussion is helpful because D1, 1/2 D1 and 1/4 D1 video signals are conventional formats, it should be noted that the invention is not limited to such examples. In fact, any number of incoming video signals can be sampled down to any other suitable resolution or picture size.

As another example, two separate audio signals can be received in which each audio signal contains four channels of audio. These incoming audio signals can be sampled or downmixed to audio signals containing only two channels of audio, *i.e.*, each audio signal is now a stereo signal. In another example, the incoming four channel audio signals can be downmixed to audio signals containing only one channel of audio, *i.e.*, each audio signal is now a mono signal. Similar to the examples relating to the incoming video signals, however, the invention is not limited to the foregoing

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examples, as any number of incoming audio signals can be sampled or downmixed to any other suitable format or size.

Once the multimedia inputs have been suitably sampled, the sampled inputs can be combined, as shown in step 214. For example, if two D1 signals have been received and sampled down to 1/2 D1 signals, these signals can be combined to create a signal that contains the same number of resolution lines as that typically carried in a full D1 signal. Similarly, if two separate four channel audio signals have been downmixed to two separate stereo signals, then these stereo signals can be combined to create a four channel audio signal.

In one arrangement, a dummy program signal can be generated, which can then be combined with one or more of the incoming sampled video signals to produce a combination of sampled signals in which the combined resolution of the combined signals - including the dummy signal - is equal to that of a D1 signal. A dummy program signal can be a video signal that contains no programming, *i.e.*, a blank picture. As an example, if three D1 signals are received, it may be desired to sample these signals down to 1/4 D1 signals, as the 1/4 D1 format is a conventional format. Notably, however, if three D1 signals are received and sampled down to 1/4 D1, the combined lines of resolution do not equal that of a full D1 signal. Significantly, many video encoders operate more efficiently on video signals with the resolution in a D1 signal. Thus, it may be useful to combine a dummy program signal to the 1/4 D1 signals to enable the encoder to operate more efficiently." (See Applicant's Specification, page 8, line 4 through page 9, line 19).

It is clear from the at least the portions of the Applicant's Specification recited above that in the invention of the Applicant a plurality of video signals and corresponding audio signals are respectively sampled such that a number of respective encoders required for encoding the plurality of video and audio signals is less than the number of the video and audio signals. For example, the Applicant teaches that four video signals can be sampled such that the resolution of each of the video signals is 1/4 that of the original four video signals. The 1/4 video signals are then combined such that only a single encoder is required for simultaneously encoding the four video signals instead of the four encoders that would be required to simultaneously encode the pre-sampled full resolution video signals.

The Applicant respectfully submits that Tanaka fails to teach, suggest, disclose or anticipate each and every element of the claimed invention, arranged as in at least the Applicant's claim 1. More specifically, the Applicant respectfully submits that there is absolutely no teaching, suggestion or disclosure in Tanaka for a method for recording multiple programs onto a storage medium and systems for

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encoding a plurality of multimedia input signals including "sampling the multimedia inputs such that the sampled multimedia inputs contain a portion of the plurality of multimedia inputs", "combining the sampled multimedia inputs" and "encoding the sampled multimedia inputs such that the number of encoding devices required to encode the sampled multimedia inputs is less than the number of the plurality of multimedia inputs" as taught in the Applicant's Specification and claimed in at least the Applicant's claim 1.

Instead, Tanaka teaches a digital signal recording apparatus arranged to be capable of permitting long-time recording on one and the same recording medium without impairing the quality of audio signals at all. In Tanaka the apparatus has a first mode in which a digital video signal supplied from a video input circuit and having the amount of information not compressed by a video compression circuit is recorded on the recording medium by a recording circuit while all of n channel digital audio signals supplied from an audio input circuit are recorded by the recording circuit; and a second mode in which the digital video signal having the amount of information compressed by the video compression circuit and only part of the n channel digital audio signals supplied from the audio input circuit are recorded by the recording circuit. (See Tanaka, Abstract). In support of the invention, Tanaka specifically recites:

"Referring to FIG. 2, input terminals 51, 52 and 53 are arranged to receive the luminance signal component Y and chrominance signal components PR and PB of a video signal, respectively. Input terminals 60, 61, 62 and 63 are arranged to receive four channel audio signals of channels ch1, ch2, ch3 and ch4, respectively. A/D converters 54, 55 and 56 are arranged to digitize the signal components Y, PR and PB supplied from the input terminals 51, 52 and 53, respectively. A/D converters 66, 67, 68 and 69 are arranged to digitize the analog audio signals supplied from the input terminals 60 to 63, respectively. Compression circuits 57, 58 and 59 are arranged to compress the amount of information of video data output from the A/D converters 54, 55 and 56 to 1/2, respectively, by carrying out a high efficiency encoding process such as predictive differential encoding. Compression circuits 72, 73, 74 and 75 are arranged to compress the amount of audio data output from the A/D converters 66, 67, 68 and 69 to 1/2, respectively, by carrying out a companding differential encoding process or the like. Adders 78 and 79 are arranged to multiplex on the time base the outputs of the compression circuits 72 and 73 with those of the compression circuits 74 and 75, respectively." (See Tanaka, col. 5, lines 21-42). (emphasis added).

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As evident from at least the portions of the disclosure of Tanaka presented above, Tanaka teaches an apparatus arranged to be capable of permitting long-time recording on one and the same recording medium without impairing the quality of audio signal. In Tanaka, and specifically with regards to FIG. 2 as pointed out by the Examiner, an apparatus receives three components of a SINGLE video signal using three different inputs. More specifically, in Tanaka input terminals 51, 52 and 53 are arranged to receive the luminance signal component Y and chrominance signal components PR and PB of a SINGLE video signal. Furthermore, in Tanaka, and specifically with regards to FIG. 2 as pointed out by the Examiner, an apparatus receives four channels of a corresponding SINGLE audio signal using four different inputs. More specifically, in Tanaka input terminals 60, 61, 62 and 63 are arranged to receive four channel audio signals of channels ch1, ch2, ch3 and ch4. However, the Applicant respectfully submits that Tanaka absolutely fails to teach, suggest or anticipate at least "receiving a plurality of multimedia inputs" as taught in the Applicant's Specification and claimed by at least the Applicant's claim 1.

More specifically, the teachings of Tanaka are in direct contrast to the invention of the Applicant in that Tanaka teaches receiving, via a plurality of respective inputs, sub-divided components of a single video signal and a corresponding audio signal. In contrast to the teachings of Tanaka, the Applicant teaches and claims "receiving a plurality of multimedia inputs" where the plurality of multimedia inputs are received via a plurality of respective video inputs and audio inputs. That is the Applicant in the Specification specifically recites "As shown in FIG. 1, the encoding path 110 can include one or more samplers 114 for sampling a corresponding number of video signals" and "The encoding path 110 can also contain one or more samplers in the form of downmixers 122 for sampling or downmixing a corresponding number of audio signals." (See Specification page 5, lines 7-15). (emphasis added). As such, the Applicant respectfully submits that the teachings of Tanaka teach away from the invention of the Applicant.

Furthermore, the Applicant respectfully submits that absolutely fails to teach, suggest or anticipate at least "sampling the multimedia inputs such that the sampled multimedia inputs contain a portion of the plurality of multimedia inputs"

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as taught in the Applicant's Specification and claimed by at least the Applicant's claim 1. More specifically, Tanaka teaches that A/D converters 54, 55 and 56 are arranged to digitize the signal components Y, PR and PB supplied from the input terminals 51, 52 and 53, respectively and that A/D converters 66, 67, 68 and 69 are arranged to digitize the analog audio signals supplied from the input terminals 60 to 63, respectively. However, Tanaka absolutely fails to teach, suggest or anticipate at least that the plurality of multimedia inputs (a plurality of video and audio signals) are sampled such that the sampled multimedia inputs contain only a portion of the plurality of multimedia inputs.

More specifically, the Applicant in the Specification teaches that the video signals are sampled such that the resolution of the plurality of multimedia inputs that are sampled is less than the resolution in each input prior to the sampling process. The Applicant teaches that, for example, video signals with a picture resolution of 720 X 480 can be sampled thereby converting them to 1/2 D1 video signals, *i.e.*, video signals with a picture resolution of 352 X 480. The Applicant further teaches that two separate audio signals can be received in which each audio signal contains four channels of audio and that the incoming audio signals can be sampled or downmixed to audio signals containing only two channels of audio, *i.e.*, each audio signal is now a stereo signal. As such, each of the sampled audio signal and video signal only contains a portion of the plurality of multimedia inputs.

There is absolutely no teaching, suggestion or anticipation in Tanaka for such "sampling the multimedia inputs such that the sampled multimedia inputs contain a portion of the plurality of multimedia inputs" as taught in the Applicant's Specification and claimed by at least the Applicant's claim 1. In contrast and as described above, Tanaka teaches that A/D converters 54, 55 and 56 are arranged to digitize the signal components Y, PR and PB supplied from the input terminals 51, 52 and 53, respectively and that A/D converters 66, 67, 68 and 69 are arranged to digitize the analog audio signals supplied from the input terminals 60 to 63, respectively. In Tanaka the digitized signals contain all of the sampled signals and not a portion of the plurality of multimedia inputs" as taught in the Applicant's Specification and claimed by at least the Applicant's claim 1. In fact,

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Tanaka does not teach sampling a plurality of multimedia inputs but instead teaches separately digitizing three components of a SINGLE video signal and separately digitizing the components of a SINGLE corresponding audio signal.

In even further contrast to the invention of the Applicant, Tanaka absolutely fails to teach, suggest or anticipate "encoding the sampled multimedia inputs such that the number of encoding devices required to encode the sampled multimedia inputs is less than the number of the plurality of multimedia inputs" as taught in the Applicant's Specification and claimed in at least the Applicant's claim 1. In contrast to the invention of the Applicant, Tanaka specifically teaches that compression circuits 57, 58 and 59 are arranged to compress the amount of information of video data output from the A/D converters 54, 55 and 56 to 1/2, respectively, by carrying out a high efficiency encoding process such as predictive differential encoding and that compression circuits 72, 73, 74 and 75 are arranged to compress the amount of audio data output from the A/D converters 66, 67, 68 and 69 to 1/2, respectively, by carrying out a companding differential encoding process or the like. That is, in Tanaka, the number of encoders required to encode the three video components and the four audio components is equal to the number of video components and the number of audio components. This is in direct contrast to the invention of the Applicant.

In the present Office Action, the Examiner cites two encoders 100 for video and 101 for audio for teaching that the audio and video signals are sampled such that the number of encoding devices is less than the number of the plurality of inputs, however the Applicant respectfully disagrees. The Applicant respectfully submits that firstly, Tanaka does not teach, suggest or anticipate encoding a plurality of multimedia outputs as taught and claimed by the Applicant, and specifically does not teach or anticipate that the plurality of sampled and combined multimedia inputs are simultaneously encoded by a number of encoding devices is less than the number of the plurality of multimedia inputs. That is, the Applicant specifically teaches that "if a conventional storage medium device receives two separate D1 video signals, then the storage medium device requires two separate video encoders to encode the D1 signals simultaneously" but that "In accordance with the inventive arrangements, however, sampling the incoming multimedia

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inputs reduces the number of encoders normally required to encode the multimedia inputs and that, for example, if two D1 video signals are sampled down to 1/2 D1 signals and then combined, then only one video encoder is needed to encode both of these signals simultaneously." (See Specification, page 10, lines 2-12).

In Tanaka, however, encoders 100 and 101 are cited by the Examiner but the encoding process is not explained or taught in Tanaka. Tanaka does not specifically teach that in encoders 100 and 101 a plurality of multimedia inputs are simultaneously encoded such that a number of encoding devices is less than the number of the plurality of multimedia inputs. That is, firstly Tanaka does not teach that a plurality of multimedia inputs are simultaneously encoded but instead teaches that a single video signal and corresponding single audio signal are encoded and specifically does not teach that a plurality of multimedia inputs are simultaneously encoded such that a number of encoding devices is less than the number of the plurality of multimedia inputs. The video and audio components may instead each be encoded sequentially.

As such and at least because the teachings of Tanaka teach away from the Invention of the Applicant and because Tanaka fails to teach, suggest or disclose at least a method for recording multiple programs onto a storage medium and systems for encoding a plurality of multimedia input signals including "sampling the multimedia inputs such that the sampled multimedia inputs contain a portion of the plurality of multimedia inputs", "combining the sampled multimedia inputs" and "encoding the sampled multimedia inputs such that the number of encoding devices required to encode the sampled multimedia inputs is less than the number of the plurality of multimedia inputs" as taught in the Applicant's Specification and claimed in at least the Applicant's claim 1, the Applicant respectfully submits that the teachings and disclosure of Tanaka do not anticipate the Applicant's Invention, at least with respect to claim 1. That is, Tanaka fails to disclose each and every element of the claimed invention, arranged as in the Applicant's claim as required for anticipation.

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Therefore, the Applicant submits that for at least the reasons recited above independent claim 1 is not anticipated by the teachings of Tanaka and, as such, fully satisfies the requirements of 35 U.S.C. § 102 and is patentable thereunder.

Likewise, independent claims 12 and 20 recite similar relevant features as recited in the Applicant's independent claim 1. As such, the Applicant submits that for at least the reasons recited above independent claims 12 and 20 are also not anticipated by the teachings of Tanaka and also fully satisfy the requirements of 35 U.S.C. § 102 and are patentable thereunder.

Furthermore, dependent claims 2-3, 6-7, 13-17 and 19 depend either directly or indirectly from independent claims 1, 12 and 20 and recite additional features therefor. As such and for at least the reasons set forth herein, the Applicant submits that dependent claims 2-3, 6-7, 13-17 and 19 are also not anticipated by the teachings of Tanaka. Therefore the Applicant submits that dependent claims 2-3, 6-7, 13-17 and 19 also fully satisfy the requirements of 35 U.S.C. § 102 and are patentable thereunder.

The Applicant reserves the right to establish the patentability of each of the claims individually in subsequent prosecution.

B. 35 U.S.C. § 103

The Examiner rejected claim 4 under 35 U.S.C. § 103(a) as being unpatentable over Tanaka in view of Campbell et al. (U.S. Patent 4,967,271, hereinafter "Campbell"). The rejection is respectfully traversed.

The Examiner states that at the time the invention was made it would have been obvious to a person of ordinary skill in the art to modify the invention of Tanaka to include the teachings of Campbell to make obvious the Applicant's claim 4. The Applicant respectfully disagrees.

As recited above and for at least the reasons recited above, the Applicant respectfully submits that the teachings of Tanaka alone fail to teach, suggest or anticipate the Applicant's independent claim 1. As such, the Applicant further submits that the teachings of Tanaka also fail to teach, suggest, anticipate or make obvious the Applicant's claim 4, which depends indirectly from the Applicant's independent claim 1 and recites additional features therefor.

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In addition, the Applicant respectfully submits that the teachings of Campbell alone, also do not teach, suggest, anticipate or make obvious the invention of the Applicant, at least with respect to independent claim 1 and, as such, dependent claim 4.

More specifically, the teachings of Campbell for a Television scan line doubler including temporal median filter fail to bridge the substantial gap between the Applicant's invention and the teachings of Tanaka. More specifically, the teachings of Tanaka and Campbell, alone or in any allowable combination, fail to teach, suggest or make obvious at least a method for recording multiple programs onto a storage medium and systems for encoding a plurality of multimedia input signals including "sampling the multimedia inputs such that the sampled multimedia inputs contain a portion of the plurality of multimedia inputs", "combining the sampled multimedia inputs" and "encoding the sampled multimedia inputs such that the number of encoding devices required to encode the sampled multimedia inputs is less than the number of the plurality of multimedia inputs" as taught in the Applicant's Specification and claimed in at least the Applicant's claim 1. As such, the Applicant further submits that the teachings of Tanaka and Campbell also fail to teach, suggest, anticipate or make obvious the Applicant's claim 4, which depends indirectly from the Applicant's independent claim 1 and recites additional features therefor.

Furthermore, the Applicant submits that there is absolutely no motivation or suggestion in either reference for the combination of Tanaka and Campbell to attempt to teach the invention of the Applicant. More specifically, there is no motivation or suggestion in the invention of Tanaka for the combination of the references and likewise, the invention of Campbell does not expressly or impliedly motivate or suggest such a combination as required by for the combination of references under 35 U.S.C. § 103.

That is, for prior art reference to be combined to render obvious a subsequent invention under 35 U.S.C. § 103, there must be something in the prior art as a whole which suggests the desirability, and thus the obviousness, of making the combination. Uniroyal v. Rudkin-Wiley, 5 U.S.P.SQ.2d 1434, 1438 (Fed. Cir. 1988). The teachings of the references can be combined only if there is

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some suggestion or incentive in the prior art to do so. In re Fine, 5 U.S.P.SQ.2d 1596, 1599 (Fed. Cir. 1988). ***Hindsight is strictly forbidden. It is impermissible to use the claims as a framework to pick and choose among individual references to recreate the claimed invention*** Id. at 1600; W.L. Gore Associates, Inc., v. Garlock, Inc., 220 U.S.P.Q. 303, 312 (Fed. Cir. 1983). (emphasis added).

Moreover, the mere fact that a prior art structure could be modified to produce the claimed invention would not have made the modification obvious unless the prior art suggested the desirability of the modification. In re Fritch, 23 U.S.P.Q.2d 1780, 1783 (Fed. Cir. 1992); In re Gordon, 221 U.S.P.Q. 1125, 1127 (Fed. Cir. 1984).

As such and for at least the reasons recited above, the Applicant respectfully submits that the teachings of Tanaka and Campbell, alone or in any allowable combination, fail to teach, suggest or make obvious the invention of the Applicant with regard to at least the Applicant's independent claim 1. As such, the Applicant further submits that the teachings of Tanaka and Campbell, alone or in any allowable combination, also fail to teach, suggest or make obvious the invention of the Applicant with regard to dependent claim 4, which depends indirectly from the Applicant's independent claim 1 and recites further features thereof.

Therefore, the Applicant submits that dependent claim 4, as it now stands, fully satisfies the requirements of 35 U.S.C. § 103 and is patentable thereunder.

The Applicant reserves the right to establish the patentability of each of the claims individually in subsequent prosecution.

C. 35 U.S.C. § 103

The Examiner rejected claims 5, 18 and 20 under 35 U.S.C. § 103(a) as being unpatentable over Tanaka in view of Sato et al. (U.S. Patent 5,566,174, hereinafter "Sato"). The rejection is respectfully traversed.

The Examiner states that at the time the invention was made it would have been obvious to a person of ordinary skill in the art to modify the invention of Tanaka to include the teachings of Sato to make obvious the Applicant's claims 5, 18 and 20. The Applicant respectfully disagrees.

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As recited above and for at least the reasons recited above, the Applicant respectfully submits that the teachings of Tanaka alone fail to teach, suggest or anticipate the Applicant's independent claims 1, 12 and 20. As such, the Applicant further submits that the teachings of Tanaka also fail to teach, suggest, anticipate or make obvious the Applicant's claims 5 and 18, which depend directly from the Applicant's independent claims 1 and 12, respectively and recite additional features therefor.

In addition, the Applicant respectfully submits that the teachings of Sato alone, also do not teach, suggest, anticipate or make obvious the invention of the Applicant, at least with respect to independent claims 1, 12 and 20 and, as such, dependent claims 5 and 18.

More specifically, the teachings of Sato for an audio signal recording apparatus with recording of different amounts of audio and video signal information in different modes fail to bridge the substantial gap between the Applicant's invention and the teachings of Tanaka. More specifically, the teachings of Tanaka and Sato, alone or in any allowable combination, fail to teach, suggest or make obvious at least a method for recording multiple programs onto a storage medium and systems for encoding a plurality of multimedia input signals including "sampling the multimedia inputs such that the sampled multimedia inputs contain a portion of the plurality of multimedia inputs", "combining the sampled multimedia inputs" and "encoding the sampled multimedia inputs such that the number of encoding devices required to encode the sampled multimedia inputs is less than the number of the plurality of multimedia inputs" as taught in the Applicant's Specification and claimed in at least the Applicant's independent claims 1, 12 and 20. As such, the Applicant further submits that the teachings of Tanaka and Sato also fail to teach, suggest, anticipate or make obvious the Applicant's claims 5 and 18, which depends directly from the Applicant's independent claims 1 and 12, respectively and recite additional features therefor.

Furthermore, the Applicant submits that there is absolutely no motivation or suggestion in either reference for the combination of Tanaka and Sato to attempt to teach the invention of the Applicant. More specifically, there is no motivation or suggestion in the invention of Tanaka for the combination of the references and

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likewise, the invention of Sato does not expressly or impliedly motivate or suggest such a combination as required by for the combination of references under 35 U.S.C. § 103.

That is, for prior art reference to be combined to render obvious a subsequent invention under 35 U.S.C. § 103, there must be something in the prior art as a whole which suggests the desirability, and thus the obviousness, of making the combination. Uniroyal v. Rudkin-Wiley, 5 U.S.P.SQ.2d 1434, 1438 (Fed. Cir. 1988). The teachings of the references can be combined only if there is some suggestion or incentive in the prior art to do so. In re Fine, 5 U.S.P.SQ.2d 1596, 1599 (Fed. Cir. 1988). ***Hindsight is strictly forbidden. It is impermissible to use the claims as a framework to pick and choose among individual references to recreate the claimed invention*** Id. at 1600; W.L. Gore Associates, Inc., v. Garlock, Inc., 220 U.S.P.Q. 303, 312 (Fed. Cir. 1983). (emphasis added).

Moreover, the mere fact that a prior art structure could be modified to produce the claimed invention would not have made the modification obvious unless the prior art suggested the desirability of the modification. In re Fritch, 23 U.S.P.Q.2d 1780, 1783 (Fed. Cir. 1992); In re Gordon, 221 U.S.P.Q. 1125, 1127 (Fed. Cir. 1984).

As such and for at least the reasons recited above, the Applicant respectfully submits that the teachings of Tanaka and Sato, alone or in any allowable combination, fail to teach, suggest or make obvious the invention of the Applicant with regard to at least the Applicant's independent claims 1, 12 and 20. As such, the Applicant further submits that the teachings of Tanaka and Sato, alone or in any allowable combination, also fail to teach, suggest or make obvious the invention of the Applicant with regard to dependent claims 5 and 18, which depend directly from the Applicant's independent claims 1 and 12, respectively, and recite further features thereof.

Therefore, the Applicant submits that independent claim 20 and dependent claims 5 and 18, as they now stand, fully satisfy the requirements of 35 U.S.C. § 103 and are patentable thereunder.

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The Applicant reserves the right to establish the patentability of each of the claims individually in subsequent prosecution.

D. 35 U.S.C. § 103

The Examiner rejected claims 8-11 under 35 U.S.C. § 103(a) as being unpatentable over Tanaka. The rejection is respectfully traversed.

As recited above and for at least the reasons recited above, the Applicant respectfully submits that the teachings of Tanaka alone fail to teach, suggest or anticipate the Applicant's independent claim 1. As such, the Applicant further submits that the teachings of Tanaka also fail to teach, suggest, anticipate or make obvious the Applicant's claims 8-11, which depend indirectly from the Applicant's independent claim and recite additional features therefor.

As such and for at least the reasons recited above, the Applicant respectfully submits that the teachings of Tanaka fail to teach, suggest or make obvious the invention of the Applicant with regard to at least the Applicant's independent claim 1. As such, the Applicant further submits that the teachings of Tanaka also fail to teach, suggest or make obvious the invention of the Applicant with regard to dependent claims 8-11, which depend indirectly from the Applicant's independent claim 1 and recite further features thereof.

Therefore, the Applicant submits that dependent claims 8-11, as they now stand, fully satisfy the requirements of 35 U.S.C. § 103 and are patentable thereunder.

The Applicant reserves the right to establish the patentability of each of the claims individually in subsequent prosecution.

Conclusion

The Applicant submits that none of the claims, presently in the application, are anticipated under the provisions of 35 U.S.C. § 102 or obvious under the provisions of 35 U.S.C. § 103. Consequently, the Applicant believes that all these claims are presently in condition for allowance. Accordingly, both reconsideration of this application and its swift passage to issue are earnestly solicited.

If however, the Examiner believes that there are any unresolved issues requiring adverse final action in any of the claims now pending in the application,

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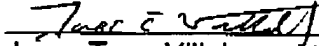
Response dated: 06/24/05

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or if the Examiner believes a telephone interview would expedite the prosecution of the subject application to completion, it is respectfully requested that the Examiner telephone the undersigned.

No fee is believed due. However, if a fee is due, please charge the additional fee to Deposit Account No. 07-0832.

Respectfully submitted,
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